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EXAMINER	
CANGIALOSI, SALVATORE A	
ART UNIT	PAPER NUMBER
3621	

DATE MAILED: 06/17/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/759,425	Applicant(s) RICE, BART F.
	Examiner Salvatore Cangialosi	Art Unit 3621

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on 22 February 2005.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) 2-39 is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) 2-39 is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 6/23/04.

4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .

5) ☐ Notice of Informal Patent Application (PTO-152)

6) ☐ Other: _____.

EA

1. All of the no-patent literature cited by applicant has now been considered since it has been included in the current application file. It is further noted that all of the cited references considered are readable on at least some of the claims since all appear to show binary spread spectrum sequences.

2. 35 USC 101 reads as follows:

"Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter or any new and useful improvement thereof, may obtain a patent therefore, subject to the conditions and requirements of this title".

3. Claims 2,7,10,11,16,19, 29-39 are rejected under 35 USC 101 because the claimed invention is directed to non-statutory subject matter.

The basis of this rejection is set forth in a two-prong test of:

(1) whether the invention is within the technological arts; and

(2) whether the invention produces a useful, concrete, and tangible result.

For a claimed invention to be statutory, the claimed invention must be within the technological arts. Mere ideas in the abstract (i.e., abstract idea, law of nature, natural phenomena) that do not apply, involve, use, or advance the technological arts fail to promote the "progress of science and the useful arts" (i.e., the physical sciences as opposed to

social sciences, for example) and therefore are found to be non-statutory subject matter. For a process claim to pass muster, the recited process must somehow apply, involve, use, or advance the technological arts.

In the present case, claims 2, 11 and 29 only recite an abstract idea. The recited steps of employing a temporal spreading code sequence does not apply, involve, use, or advance the technological arts since all of the recited steps can be performed in the mind of the user or by use of a pencil and paper. These steps only constitute an idea of how to employ a temporal spreading code sequence.

Mere intended or nominal use of a component, albeit within the technological arts, does not confer statutory subject matter to an otherwise abstract idea if the component does not apply, involve, use, or advance the underlying process.

In the present case, the claim limitations are analogous to non-functional descriptive data (See MPEP 2106). IT IS ALSO NOTED THAT ALL SEQUENCES ARE TEMPORAL.

4. The following is a quotation of 35 U.S.C. § 103 which forms the basis for all obviousness rejections set forth in this Office action:

> A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
>
> Subject matter developed by another person, which qualifies as prior art only under subsection (f) or (g) of section 102 of this title, shall not preclude patentability under this section where the subject matter and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person.

5. Claims 2-38 are rejected under 35 U.S.C. § 103 as being unpatentable over Frazier. Jr. or Kaufman et al in view of Short et al(all cited by applicant).

Regarding claim 2, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) disclose an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers and placed on a sinusoidal carrier substantially as claimed. The differences between the

above and the claimed invention is the use of binary signals from shift registers which represent a portion of the information and temporal sequences. It is noted that the symbols of the prior art described above show digital sequences representing symbols would be readable on the claim limitations. It is further noted that all sequences are temporal since they require a finite time to output and describe a static or variable output. Short et al (See Figs. 2B-3) show a multibit sequences produces by a plurality of shift registers in a spread spectrum signal. It would have been obvious to the person having ordinary skill in this art to provide a similar arrangement for Frazier. Jr. or Kaufman et al because the digital signals and multibit sequences signals are conventional functional equivalents. Regarding the receiver limitations of claim 3, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 4, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal

pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the transmitter limitations of claim 5, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 6, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding plural sequence limitations of claim 7, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding the phase

limitations of claim 8, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading that is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 9, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading which is a functional equivalent of the claim limitations. Regarding sequence limitations of claim 10, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding claim 11, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60

and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) disclose an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers and placed on a sinusoidal carrier substantially as claimed. The differences between the above and the claimed invention is the use of binary signals from shift registers which represent a portion of the information and temporal sequences. It is noted that the symbols of the prior art described above show digital sequences representing symbols would be readable on the claim limitations. It is further noted that all sequences are temporal since they require a finite time to output and describe a static or variable output. Short et al (See Figs. 2B-3) show a multibit sequences produces by a plurality of shift registers in a spread spectrum signal. It would have been obvious to the person having ordinary skill in this art to provide a similar arrangement for Frazier. Jr. or Kaufman et al because the digital signals and multibit sequences signals are conventional functional equivalents. Regarding the receiver limitations of claim 12, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a

functional equivalent of the claim limitations. Regarding the network limitations of claim 13, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the transmitter limitations of claim 14, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 15, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding plural sequence limitations of claim 16, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines

40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 17, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading that is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 18, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading which is a functional equivalent of the claim limitations. Regarding sequence limitations of claim 19, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig.

2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding claim 20, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) disclose an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers and placed on a sinusoidal carrier substantially as claimed. The differences between the above and the claimed invention is the use of binary signals from shift registers which represent a portion of the information and temporal sequences. It is noted that the symbols of the prior art described above show digital sequences representing symbols would be readable on the claim limitations. It is further noted that all sequences are temporal since they require a finite time to output and describe a static or variable output. Short et al (See Figs. 2B-3) show a multibit sequences produces by a plurality of shift registers in a spread spectrum signal. It would have been obvious to the person having ordinary skill in this art to provide a similar arrangement for Frazier. Jr. or Kaufman et al because the digital signals and multibit sequences signals are conventional functional equivalents. Regarding the receiver limitations of claim 21, either Frazier. Jr. (See Figs.

6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 22, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the transmitter limitations of claim 23, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 24, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly

of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding plural sequence limitations of claim 25, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 26, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading that is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 27, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift

registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading which is a functional equivalent of the claim limitations. Regarding sequence limitations of claim 28, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding claim 29, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) disclose an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers and placed on a sinusoidal carrier substantially as claimed. The differences between the above and the claimed invention is the use of binary signals from shift registers that represent a portion of the information from transmission and reception nodes. It is noted that all sequences are temporal. It is noted that the symbols of the prior art described above show digital sequences representing symbols would be readable on the claim limitations. Short et al (See Figs. 2B-3) show a multibit sequences produces by a plurality of shift registers in a spread spectrum signal from transmission and reception nodes. It would have been obvious to

the person having ordinary skill in this art to provide a similar arrangement for Frazier. Jr. or Kaufman et al because the digital signals and multibit sequences signals are conventional functional equivalents. Regarding the receiver limitations of claim 30, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 31, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding the transmitter limitations of claim 32, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network

which is a functional equivalent of the claim limitations. Regarding the network limitations of claim 33, either Frazier. Jr. (See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with reception and transmission through a network which is a functional equivalent of the claim limitations. Regarding plural sequence limitations of claim 34, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 35, either Frazier. Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading that is a functional equivalent of the claim limitations. Regarding the phase limitations of claim 36, either Frazier. Jr.(See Figs.

6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers with plural phase symbol (See Frazier. Jr., Col. 2, lines15-20, or Kaufman et al, Col. 8, lines25-40) spreading which is a functional equivalent of the claim limitations. Regarding sequence limitations of claim 37, either Frazier Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding sequence limitations of claim 38, either Frazier Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread spectrum signals created from a plurality of orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations. Regarding sequence limitations of claim 39, either Frazier Jr.(See Figs. 6 and 7, Col. 6, lines 40-60, Col. 15, lines 45-60 and claims 12 and 15) or Kaufman et al(See Fig. 2, 8, Col. 8 lines 20-6 and claim 1) show an assembly of spread

spectrum signals created from a plurality of unique orthogonal pseudorandom sequences by storage in a plurality of shift registers which is a functional equivalent of the claim limitations.

6. Applicants arguments filed 02/22/2005 have been considered but are not persuasive.

Any inquiry concerning this communication should be directed to Salvatore Cangialosi at telephone number **(571) 272-6927**. The examiner can normally be reached 6:30 Am to 5:00 PM, Tuesday through Friday. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James Trammell, can be reached at **(571) 272-6712**.

Any response to this action should be mailed to:

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Alexandria, VA 22313-1450

or faxed to (703)872-9306

Hand delivered responses should be brought to

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401 Dulany Street
Alexandria, VA 22314

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 3600 Customer Service Office whose telephone number is **(703) 306-5771.**

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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PRIMARY EXAMINER
ART UNIT 222